ABSTRACT

An autostereoscopic display comprises a pixellated transflective spatial light modulator which is arranged to provide a visual indication to an observer of the amount of crosstalk caused by reflection of ambient illumination. The display comprises a rear parallax barrier between a backlight and the modulator. Part of the barrier is formed as a screen blocking transmitted light from a first region of the modulator so that the pixels in this region are visible only by reflection of ambient illumination. In a second region, the pixels are illuminated with both transmitted and reflected light. A controller sets the pixels of the first region to maximum intensity and the pixels of the second region to a fraction of the maximum intensity. The fraction corresponds, for example, to a maximum amount of crosstalk which is permissible for autostereoscopic viewing. When the brightness of the first region is darker than or the same as the brightness of the second region, crosstalk is sufficiently low to permit autostereoscopic viewing.